Name _____ Date _____

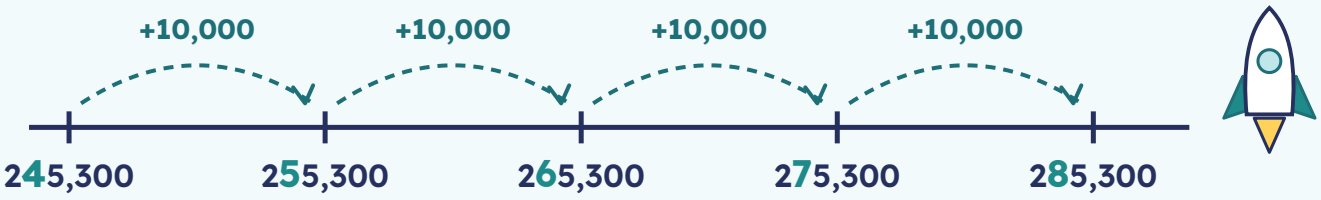
# Count in steps

Count on and back in 10s, 100s, 1,000s, 10,000s and 100,000s.

## 1 Learn



When you count in steps of 10, 100, 1,000, 10,000 or 100,000, only the digit in **that place** changes, unless it goes past 9.




Counting on in steps of **10,000**: only the **ten thousands** digit changes.

**What is 10,000 more than 392,000?**

**1.** The step is 10,000, so look at the **ten thousands** digit: 9.

**2.** 9 + 1 = 10 ten thousands. Write **0** and swap the 10 for 1 hundred thousand.

**3.** The hundred thousands digit goes from 3 to 4:

**402,000**

| HTh | TTh | Th | H | T | O |
|---|---|---|---|---|---|
| 3 | 9 | 2 | 0 | 0 | 0 |
| 4 | 0 | 2 | 0 | 0 | 0 |

**Flip's tip:** find the place that matches the step **first**. Then change just that digit by 1. Going past 9? Write 0 and add 1 to the place on its left.

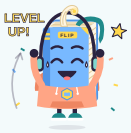
**Warm up:** start at **45,670** each time.

10 more _____ 100 more _____ 1,000 more _____

**Grown-ups:** 10, 100, 1,000, 10,000 and 100,000 are called powers of 10. Ask "Which digit will change?" before your child writes the next number.

Name _____ Date _____

## 2 Try it together a child and a grown-up, about 10 minutes




### Launch track

**You need:** 8 scraps of paper, a pencil, and a small toy or bottle top to be the rocket.

1. Lay the 8 scraps in a row on a table: this is the launch track.
2. A grown-up picks a start number and a step: 10, 100, 1,000, 10,000 or 100,000. Write the start on the first scrap.
3. Move the rocket along one scrap at a time. Say the next number, then write it. Which digit changes each time?
4. At the end, count back down the track to the start. Then swap jobs and try a new step.

| Start | Step | On or back? | Last number on the track |
|---|---|---|---|
| 86,500 | 1,000 | on | |
| | | | |
| | | | |

**Grown-ups:** the first row crosses 90,000 (89,500 then 90,500), so watch for the swap. Choose starts like 195,000 with a step of 1,000 to cross 200,000.

## 3 Practise

**A.** Fill the gaps. What step is each one counting in?

**34,520, 34,530, ____, 34,550, ____**

**708,100, 708,200, ____, ____, 708,500**

**96,000, 97,000, ____, ____, 100,000**

**450,000, 350,000, ____, ____, 50,000**

**123,456, 133,456, ____, ____, 163,456**

Name _____ Date _____

**B.** Fill in the table.

| Number | 10 more | 1,000 less | 10,000 more | 100,000 less |
|---|---|---|---|---|
| 275,390 | | | | |
| 409,995 | | | | |
| 100,050 | | | | |

**C.** What step is the rocket taking? Is it counting on or back?

**52,800 → 62,800 → 72,800**
Step: _____ On or back: _____

**605,000 → 505,000 → 405,000**
Step: _____ On or back: _____

**18,090 → 18,100 → 18,110**
Step: _____ On or back: _____

**7,450 → 6,450 → 5,450**
Step: _____ On or back: _____

**D.** The Moon is about **384,400 km** from Earth. Pip's rocket has flown **284,400 km**. How many jumps of **10,000 km** will take it to the Moon?

Working: Answer: jumps

## Challenge

Ava says, "1,000 more than 59,600 is 59,700." Is she right? What is 1,000 more than 59,600?

## I can... Tick when you can.

- ☐ count on and back in steps of 10, 100, 1,000, 10,000 and 100,000
- ☐ change the right digit for each step
- ☐ count on past a 9, like 392,000 to 402,000